REMARKS

Claims 1-83 are pending in the application. Claims 1, 39, 51 and 52 are currently amended.

Claims 1 and 52 have been amended to add a further limitation that the crosslinker is different from the vegetable oil-based polyol. These amendments find support in Paragraph 74 of the Specification, wherein a low molecular weight polyol is disclosed as a crosslinker and defined as having a molecular weight less than half of the molecular weight of the vegetable oil-based polyol. Claim 39 has also been amended to change the range of crosslinker used. Claim 51 has been amended to delete reference to a general class of crosslinkers. None of these amendments add new matter to the application.

Claim Rejections - 35 U.S.C. §112 Second Paragraph

Claims 1-27, 29-38 and 51-83 stand rejected under 35 U.S.C. §112 Second Paragraph as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. Applicant has amended Claims 1 and 52 for purpose of clarification to specify that the crosslinker is added in an amount effective to enhance the structural properties of the claimed composition over other polymer concrete compositions without the added crosslinker. Claim 51 has been amended to delete the limitation directed to the "effective amount of crosslinker for increasing" Claims 2-27, 29-38 and 53-83 all depend from Claims 1 or 52. Withdrawal of the rejections is respectfully requested.

Claim Rejections - 35 U.S.C. §112 First Paragraph

Claims 1-27, 29-38 and 51-83 stand rejected under 35 U.S.C. §112 First Paragraph as failing to comply with the written description requirement. Examiner maintains that the recited crosslinker in an effective amount is not described in a way that reasonably conveys to a person of ordinary skills in the art that the inventors had possession of the claimed invention at the time the application was filed and thus constitutes new matter. Applicant respectfully traverses Examiner's position.

The specification and drawings are replete with numerous examples and ranges that characterize the claimed effect. The use of "effective amounts" language is a common practice in claim drafting, and is well supported by this specification. This disclosure is

entirely effective to convey to a person of ordinary skill in the art the use of an "effective amount of a crosslinker different from said vegetable oil-based polyol for increasing at least one structural properties of the composition over polymer concrete composition made without said crosslinker, said structural properties selected from the group consisting of compressive strength, flexural modulus, tensile strength, and hardness." This is because the substantially all of the figures and specification is devoted to disclosing a study that shows the sensitivity of these properties to different amounts of crosslinker and condition.

It is also unnecessary to provide support in ipsis verbis for what is claimed. This means that the written description requirement does not require an applicant to match verbatim every word used in the claims with those in the specification. Moreover, claim limitation to a genus may be supported by adequate disclosure of representative species. In re Robins, 429 F.2d 452, 456-57, 166 USPQ 552, 555 (CCPA 1970) ("[W]here no explicit description of a generic invention is to be found in the specification[,] ... mention of representative compounds may provide an implicit description upon which to base generic claim language."). As Examiner has acknowledged, Applicant discloses glycerine by way of example as a crosslinker to improve several properties of the claimed compositions (See Paragraph 17 of the instant application). Other crosslinkers, such as a low molecular weight polyol, are also disclosed in the Specification (See Paragraphs 71 and 74). Applicant also discloses the amount of glycerine or other crosslinkers to achieve sufficient structural properties (See Paragraph 71). By way of example, the Specification compares the effects of varying amounts of glycerine on the compressive strength, flexural modulus, tensile strength, and hardness of the compositions (See, e.g., Figs. 2-5 and 11-14). Examples 2-5 further demonstrate how the amount of glycerine affects the structural properties of the claimed compositions (See e.g., Paragraphs 104 and 126). Taken together, one of skill in the art would know how to select a suitable crosslinker and to test the effective amount of said crosslinker by following the examples provided in the present application. Thus, such a skilled person would reasonably conclude that the inventors had possession of the claimed invention at the time the application was filed. Withdrawal of the rejections based on 35 U.S.C. §112 First Paragraph is respectfully requested.

Claim Rejections - Obviousness-type Double Patenting

Claims 1-83 stand rejected for obviousness-type double patenting over claims 1-5 of United States Patent 6,686,435 ('435 Patent). The examiner recognizes that the present claims and the claims of the '435 Patent are not the same, but maintains that these claims are not patentably distinct from each other. Applicant respectfully traverses the rejection for the reasons explained below.

It is the examiner's proposition that the present claims are obvious over those of the '435 patent because a portion of the '435 polyol may act as the claimed crosslinker. The amended claims clarify that the crosslinker is different. The amendment should not be necessary because these are claimed as different ingredients, and the nature of the amendment is to clarify what was already in the claims. The use of a different crosslinker as claimed provides useful strength advantages as shown in the figures according to previous remarks.

The basic inquiry in context of the present rejection is whether the present claims are an obvious variation of claims 1-5 of the '435 patent. Claims 1 and 51, as currently amended, recite an effective amount of a crosslinker different from said vegetable oil-based polyol for enhancing at least one structural properties of the composition over polymer concrete composition made without said crosslinker, including compressive strength, flexural modulus, tensile strength, and hardness. Claim 39, as currently amended, specifically sets a limitation of the amount of crosslinker to be added ("1 pph to 10 pph of a crosslinker based upon weight of the vegetable oil-based polyol"). Claim 51 recites the use of glycerine, which is not mentioned in the '435 patent. These amendments, as explained in the previously section, are supported by the Specification as originally filed.

By contrast, the '435 patent does not disclose the use of a crosslinker, nor is there any disclosure as to the effective amount of such a crosslinker to enhance the structural properties of the resultant compositions. In rejecting the instant claims, the examiner reasons that the vegetable oil-based polyol disclosed in the '435 patent can also function as a crosslinker. The present claims, as currently amended, specifically add a limitation that the crosslinker is not the same as the vegetable oil-based polyol. Even if the vegetable oil-based polyol does function as a crosslinker, the present claims recite a crosslinker in addition to the vegetable oil-based polyol.

Furthermore, the rejection fails to recognize that the '435 Patent teaches away from adding a crosslinker to form the compositions. See, e.g., col. 5, lines 29-35 of the '435 Patent ("[T]he present invention avoids substantial side-reactions, such as polymerization or crosslinking."). Indeed, the '435 Patent states that avoiding crosslinking is one of the ways to obtain polyol of narrow Molecular Weight Distribution (MWD). See col. 5, lines 43-47 of the '435 Patent. Thus, the '435 Patent not only fails to describe or suggest all the claims limitations of the present claims, but it also teaches way from the instantly claimed invention. In this regard, it is also seen that the examiner's broad interpretation of "crosslinker" is contrary to the specific teaching of the '435 patent (and the art as a whole), which considers that the '435 resin does not crosslink unto itself. The claimed use of a different crosslinker cannot be obvious where: (A) the '435 patent teaches away from this concept, and (B) applicants have demonstrated significant advantages in using a different crosslinker.

Withdrawal of the obviousness-type double patenting rejections over the '435 Patent is respectfully requested.

The foregoing response meets all of the requirements set forth in the Office Action dated March 8, 2006 and Applicant is respectfully seeking a Notice of Allowance.

Applicants' attorney urges Examiner Niland to telephone if a conversation could expedite prosecution. The Commissioner is authorized to charge any required fees to deposit account 12-0600.

Respectfully submitted,

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